Claims 1-4 were rejected under 35 U.S.C. 102(b) as being anticipated by Kenichi et al. (JP 04061269 A). Applicants respectfully traverse the rejection and submit tht claim 1-4 recite subject matter which is not described or shown by Kenichi.

It was asserted in the Office Action that Kenichi shows a semiconductor device including a lightly doped semiconductor substrate (n-type substrate 1) of a first conduction type and a semiconductor region (n-well 6) of the first conduction type, wherein a concentration of an impurity in the semiconductor region of the first conduction type is substantially equal to a concentration of an impurity in the semiconductor substrate. However, Kenichi does not show or describe this feature.

The last sentence of the CONSTITUTION section of the English abstract of Kenichi states, "[S]ince an impurity is not diffused except a $p^+$-type layer 7 of the substrate 1 in the formation of a high energy implanted $p^+$-type layer 7, the well 6 is the same as the formation on the substrate in which no p-type impurity exists". Applicant submits that this statement is inaccurate.

Kenichi should be translated to state, "Since, in forming the high-energy injected $p^+$-type layer 7, the dopant is diffused in no region other than the $p^+$-type layer 7 in the n-type substrate 1, and the n-well 6 is formed substantially on the n-type substrate where the p-type dopant is absent". This, Applicants submit, is an accurate translation, and a attached is a partial translation of a Japanese specification of Kenichi et al. (Page 2, lower left column, line 8 - lower right column, line 11). If a declaration or affidavit to this effect is desired, Applicants will readily provide the same upon request.

As described in the specification of Kenichi, the concentration of the impurity in the n-well 6 is equal to the concentration of the impurity in the n-well 2. The n-well 2

and the n-well 6 are formed by implanting an n-type impurity in the n-type substrate 1. Therefore, Kenichi must teach that the concentration of the impurity in the n-well 6 is higher than the concentration of the impurity in the n-type substrate 1. In contrast, claim 1 of the present invention recites a concentration of an impurity in a semiconductor region of a first conduction type is substantially equal to a concentration of an impurity in a semiconductor substrate. Thus, Kenichi fails to teach each and every element of claim 1, and claims 2-4 by their dependencies. Accordingly, Applicants request that the rejection be withdrawn and claims 1-4 be allowed.

Claims 5-7 were rejected under 35 U.S.C. § 103(a) as being unpatentable over Kenichi in view of Applicants admitted prior art (AAPA). In particular, it was admitted that Kenichi fails to show a memory cell. To make up for this deficiency, it was asserted that the AAPA teaches a memory cell, and therefore, that it would have been obvious to one skilled in the art provide the first and second semiconductor elements of Kenichi to include the teachings of the AAPA in order to derive the present invention. Applicants respectfully traverse the rejection and submit that claims 5-7 recite subject matter not taught or suggested by any combination of the cited prior art.

As described above, in Kenichi, the concentration of the impurity in the n-well 6 is not substantially equal to the concentration of the impurity in the n-type substrate 1. In contrast, claim 1 requires that the concentration of an impurity in the semiconductor region of the first conduction type is substantially equal to the concentration of an impurity in the semi-conductor substrate. Since claim 5-7 depend from claim 1, it would not have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teaching of Kenichi with the AAPA, since the combination thereof

would still fail to provide all the requirements of claims 5-7. Accordingly, Applicants request that the rejection be withdrawn and claims 5-7 be allowed.

In view of the above remarks, the Applicants respectfully submit that each of claims 1-7 recite subject matter which is neither disclosed nor suggested in the cited prior art. Applicants submit that this subject matter is more than sufficient to render the claimed invention unobvious to a person of ordinary skill in the art. Applicants therefore request that each of 1-7 be found allowable, and this application passed to issue.

If for any reason the Examiner determines that the application is not now in condition for allowance, it is respectfully requested that the Examiner contact, by telephone, the Applicants' undersigned attorney at the indicated telephone number to arrange for an interview to expedite the disposition of this application.

In the event this paper is not timely filed, the Applicants respectfully petitions for an appropriate extension of time. Any fees for such an extension together with any additional fees may be charged to Counsel's Deposit Account No. 01-2300.

Respectfully submitted,

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Enclosure: Partial translation of Kenichi et al.

A PARTIAL TRANSLATION OF A JAPANESE SPECIFICATION OF KENICHI ET AL.

(Page 2, lower left column, line 8 - lower right column, line 11)

(Embodiment)

One embodiment of the present invention will be explained with reference to the drawings.

FIG. 1 is a view showing a sectional structure of the semiconductor device according to the embodiment of the present invention. In the drawing, reference number 1 represents an n-type semiconductor substrate; 2 and 6, respectively n wells of the same concentration; 3, 4 and 5, respectively p-well of the same concentration; and 7, a $p^+$-type layer formed in the n-type semiconductor substrate 1 by high-energy injection. The n-well 6 is surrounded by the p-wells 3, 5 and the high-energy injected $p^+$-type layer, whereby the n-well 6 is electrically insulated from the n-type substrate 1 and the n-well 2.

Next, advantageous effects will be explained with reference to FIG. 1.

As shown in FIG. 1, the n-wells are never formed in the p-wells, which makes it unnecessary that the p-wells 3, 4, 5 have different concentrations. This permits the p-wells 3, 4, 5 to be formed by the same step. Since, in forming the high-energy injected $p^+$ type layer 7, the dopant is diffused in no region other than the $p^+$-type layer 7 in the n-type substrate 1, the n-well 6 is formed substantially on the n-type substrate where the p-type dopant is absent. Accordingly, in forming the n-well 2 and the n-well 6, it is not necessary that their dopant doses are different from each other, which permits the n-well 2 and the n-well 6 to be formed by the same step.